

CITY OF SALMON, PWS #7300042
SOURCE WATER ASSESSMENT REPORT

January 31, 2001



State of Idaho
Department of Environmental Quality

Disclaimer: This publication has been developed as part of an informational service for the source water assessments of public water systems in Idaho and is based on the data available at the time and the professional judgement of the staff. Although reasonable efforts have been made to present accurate information, no guarantees, including expressed or implied warranties of any kind, are made with respect to this publication by the State of Idaho or any of its agencies, employees, or agents, who also assume no legal responsibility for the accuracy of presentations, comments, or other information in this publication. The assessment is subject to modification if new data is produced.

Executive Summary

Under the Safe Drinking Water Act Amendments of 1996, all states are required by the U.S. Environmental Protection Agency to assess every source of public drinking water for its relative sensitivity to contaminants regulated by the act. This assessment is based on a land use inventory of the designated assessment area and sensitivity factors associated with the watershed characteristics.

This report, *Source Water Assessment for City of Salmon, Idaho*, describes the public drinking water system, the zone boundaries of water contribution, and the associated potential contaminant sources located within these boundaries. This assessment should be used as a planning tool, taken into account with local knowledge and concerns, to develop and implement appropriate protection measures for this source. **The results should not be used as an absolute measure of risk and they should not be used to undermine public confidence in the water system.**

The City of Salmon drinking water system consists of four surface water intake structures along the Salmon River, Chipps Creek, Jessie Creek, and Pollard Creek. The four intakes route water to a manifold system and a water treatment plant. In the summer of 1993, the system experienced levels of microbial bacteria contamination that exceeded the drinking water Maximum Contaminant Level. In terms of the total susceptibility score, the four intakes rate moderate to low for inorganic contaminants, volatile organic contaminants, and synthetic organic contaminants.

This assessment should be used as a basis for determining appropriate new protection measures or re-evaluating existing protection efforts. No matter what ranking a source receives, protection is always important. Whether the source is currently located in a “pristine” area or an area with numerous industrial and/or agricultural land uses, the way to ensure good water quality in the future is to act now to protect valuable water supply resources.

Due to the fairly short time associated with the movement of surface waters, source water protection activities should be aimed at short-term management strategies with the development of long-term management strategies to counter any future contamination threats. Source water protection activities for mining should be coordinated with the appropriate state and/or federal agencies responsible for the regulation or cleanup of the mine. Depending on the nature and status of the mine, various agencies could include Idaho Department of Environmental Quality, the U.S. Environmental Protection Agency, the Department of Lands, the Bureau of Land Management, the U.S. Forest Service, or others.

A community with a fully-developed source water protection program will incorporate many strategies. For assistance in developing protection strategies please contact the Idaho Falls Regional Office of the Idaho Department of Environmental Quality or the Idaho Rural Water Association.

SOURCE WATER ASSESSMENT FOR CITY OF SALMON

Section 1. Introduction - Basis for Assessment

The following sections contain information necessary to understand how and why this assessment was conducted. **It is important to review this information to understand what the ranking of this source means.** A map showing the delineated source water assessment areas, a map showing the entire watershed contributing to the delineated area, a map showing the twenty-four (24) hour emergency response delineation, and the inventory of significant potential sources of contamination identified within the delineated area are included. The list of significant potential contaminant source categories and their susceptibility rankings used to develop this assessment is also attached.

Background

Under the Safe Drinking Water Act Amendments of 1996, all states are required by the U.S. Environmental Protection Agency (EPA) to assess every source of public drinking water for its relative susceptibility to contaminants regulated by the Safe Drinking Water Act. This assessment is based on a land use inventory of the delineated assessment area, sensitivity factors associated with the intakes, and watershed characteristics.

Level of Accuracy and Purpose of the Assessment

Since there are over 2,900 public water sources in Idaho that must be completed by May of 2003, an in-depth, site-specific investigation of each significant potential source of contamination is not possible. **Therefore, this assessment should be used as a planning tool, taken into account with local knowledge and concerns, to develop and implement appropriate protection measures for this source. The results should not be used as an absolute measure of risk and they should not be used to undermine public confidence in the water system.**

The ultimate goal of this assessment is to provide data to local communities to develop a protection strategy for their drinking water supply system. The Idaho Department of Environmental Quality (DEQ) recognizes that pollution prevention activities generally require less time and money to implement than treating a public water supply system once it has been contaminated. DEQ encourages communities to balance resource protection with economic growth and development. The decision as to the amount and types of information necessary to develop a source water protection program should be determined by the local community based on its own needs and limitations. Source water protection is one facet of a comprehensive growth plan, and it can complement ongoing local planning efforts.

Section 2. Conducting the Assessment

General Description of the Source Water Quality

The City of Salmon, Idaho serves a community of approximately 3,080 people through 1509 connections. The City of Salmon is located along the Salmon River at the junction of Highway 93 and Highway 28 (Figure 1). The public drinking water system for the City of Salmon is comprised of four drinking water intakes. These intakes are located along Chipps Creek, Jesse Creek, Pollard Creek, and the Salmon River. Average production yielded 1,400,000 gallons per day in 1995.

The primary water quality issue currently facing the City of Salmon and most surface water systems is that of possible microbial pathogens and the problems associated with managing it.

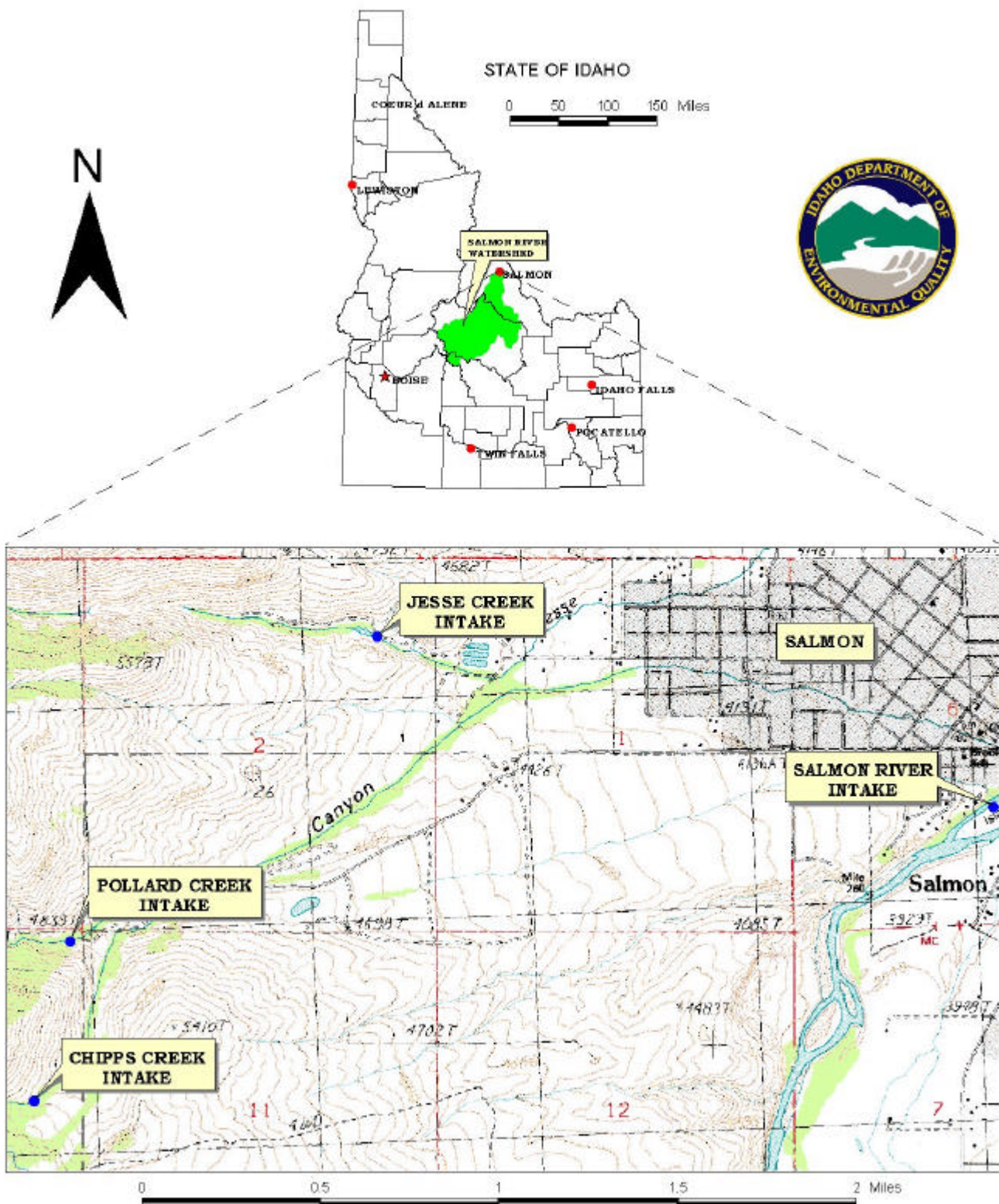
Defining the Zones of Contribution--Delineation

To protect surface water systems from such potential contaminant pathways, the EPA required that the entire drainage basin be delineated upstream from the intake to the hydrologic boundary of the drainage basin (U.S. EPA, 1997b). This delineation is also referred to as a topographic delineation for systems with consisting of small streams. The delineation process established the physical area around an intake that became the focal point of the assessment. The Chipps Creek (Figure 2), Jesse Creek (Figure 3), and Pollard Creek (Figure 4) intakes were delineated with a topographic delineation.

The EPA recognized that an intake on a large water body, such as the Salmon River, could have an extensive drainage basin. Therefore, the EPA recommended that large drainage basins be segmented into smaller areas for the purpose of implementing a cost-effective potential contaminant inventory and susceptibility analysis. The delineation process established the physical area around an intake that became the focal point of the assessment. The process included mapping the boundaries of the zone of contribution into a river buffer zone that extends from the intake upstream 25 miles or to the 4-hour streamflow time-of-travel boundary, whichever is greater. This buffer zone also extends up tributaries to the remainder of the 25-mile boundary or the 4-hour time-of-travel boundary. This time-of-travel boundary is based on gauge station information. The Salmon River Intake delineation is illustrated in Figure 5.

The delineated source water assessment area for the Salmon River Intake can best be described as a buffered area, 500 feet on either side of the river, extending upstream 25 miles, including stream reaches within the area. The actual data used by DEQ in determining the source water assessment delineation is available upon request.

FIGURE 1. Geographic Location & Topographic Watershed Delineation for the City of Salmon



A delineation of the watershed and stream segments encompassed by a 24-hour time-of-travel was produced to provide system operators with a map for emergency response purposes. This map would allow the operators to be aware of the roads, railroads, and major sources of contamination that are located close to the stream network in case of a major spill which could impact their drinking water system intake. Stream velocity for time-of-travel estimates was calculated using the mean annual daily flow. A 500-foot buffer on either side of major stream segments was used to identify major sources of contamination such as aboveground storage tanks, National Pollutant Discharge Elimination System (NPDES) sites, and Resource Conservation Recovery Act (RCRA) facilities. This delineation for the City of Salmon extends roughly 51 miles upstream and is illustrated in Figure 6.

Identifying Potential Sources of Contamination

A potential source of contamination is defined as any facility or activity that stores, uses, or produces, as a product or by-product, the contaminants regulated under the Safe Drinking Water Act and has a sufficient likelihood of releasing such contaminants at levels that could pose a concern relative to drinking water sources. The goal of the inventory process is to locate and describe those facilities, land uses, and environmental conditions that are potential sources of surface water contamination. The locations of potential sources of contamination within the delineation areas were obtained by field surveys conducted by DEQ and from available databases.

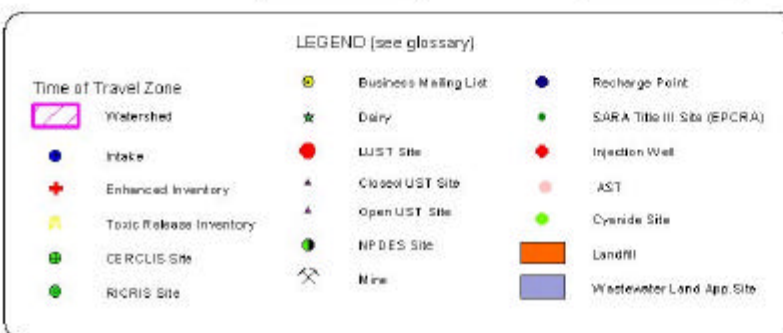
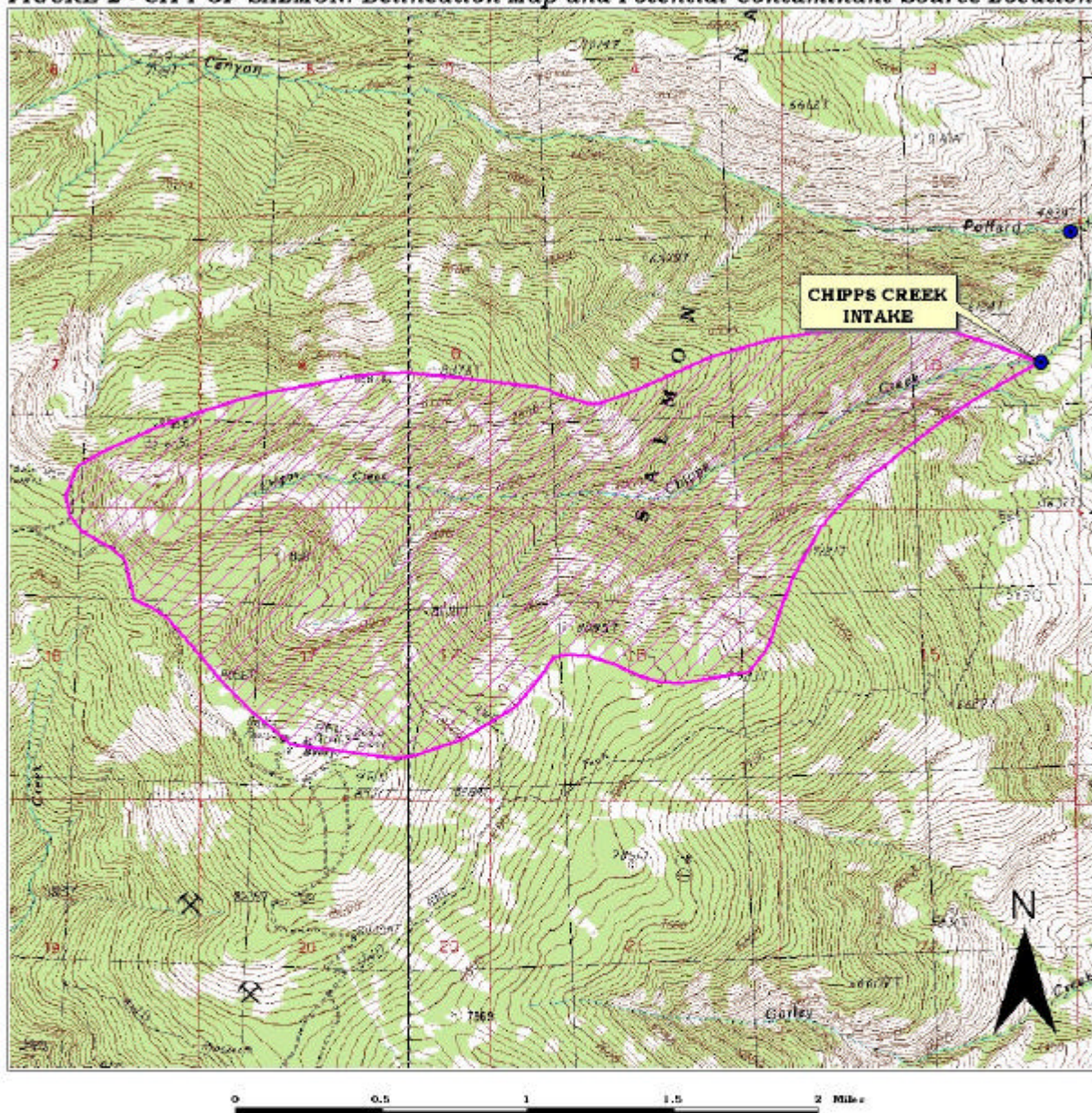
Land use within City of Salmon source water delineated areas consist predominantly of range land, some irrigated agricultural land, some forested land, rural residential homes, recreation, and mining facilities. Homes and businesses within the City of Salmon are attached to a centralized sewer system. Homes and businesses outside the city operate with individual septic systems.

It is important to understand that a release may never occur from a potential source of contamination, provided best management practices are used at the facility. Many potential sources of contamination are regulated at the federal level, state level, or both, to reduce the risk of release. Therefore, when a business, facility, or property is identified as a potential contaminant source, this should not be interpreted to mean that this business, facility, or property is in violation of any local, state, or federal environmental law or regulation. What it does mean is that the potential for contamination exists due to the nature of the business, industry, or operation. There are a number of methods that water systems can use to work cooperatively with potential sources of contamination, such as educational visits and inspections of stored materials. Many owners of such facilities may not even be aware that they are located near a public water supply intake.

Contaminant Source Inventory Process

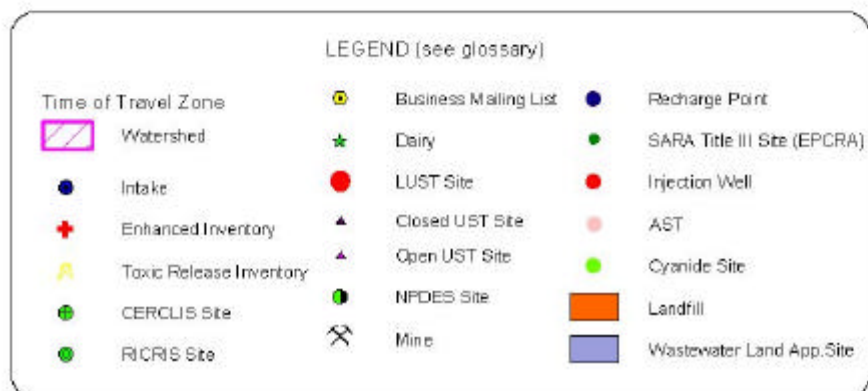
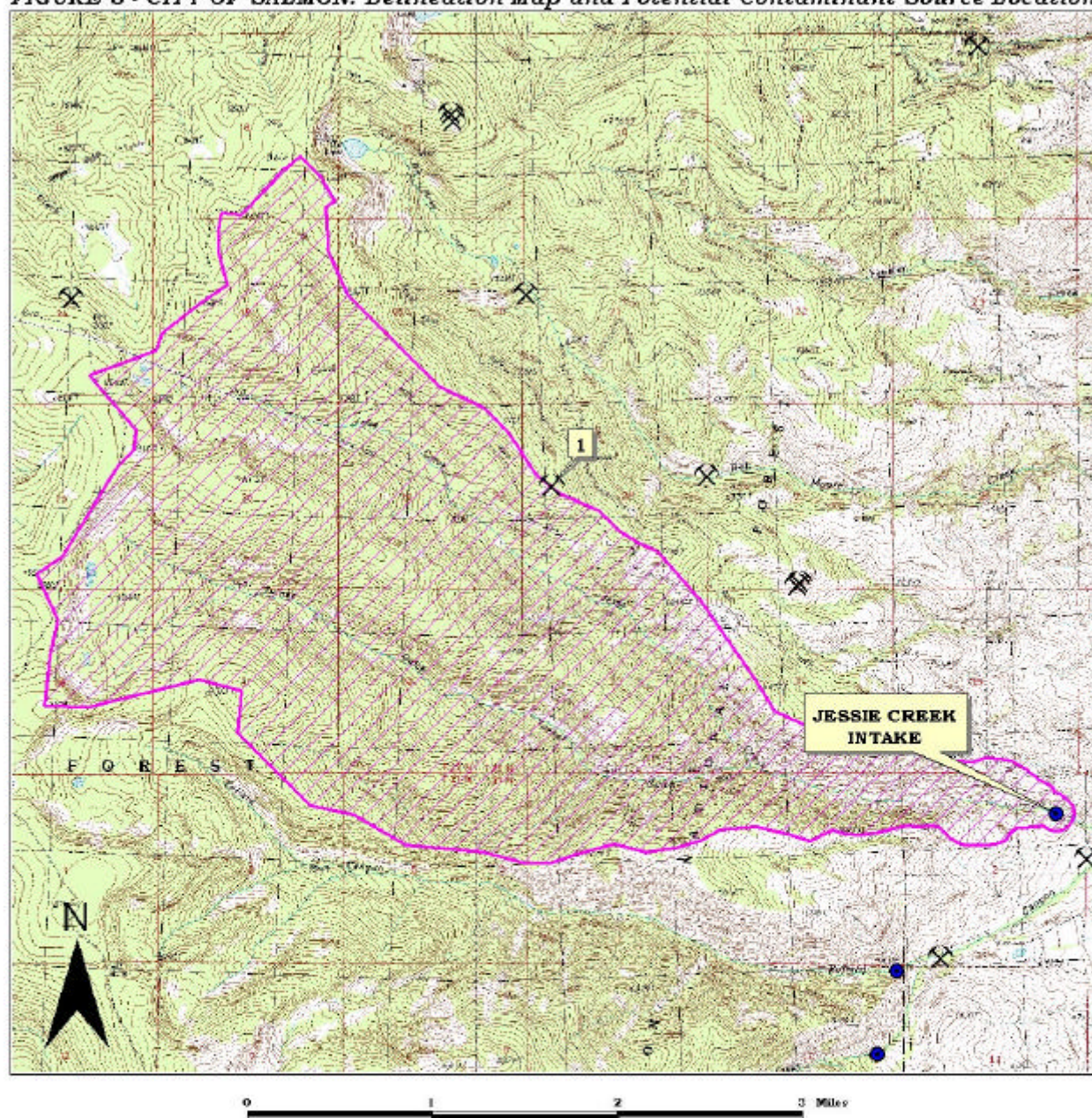
A contaminant inventory was conducted for the City of Salmon system in September 2000. The process involved identifying and documenting potential contaminant sources within the City of Salmon Source Water Assessment Areas through the use of computer databases and Geographic Information System maps developed by DEQ. Maps showing the delineated areas with the potential contaminant sources are included (Figures 2, 3, 4, and 5).

FIGURE 2 - CITY OF SALMON: Delineation Map and Potential Contaminant Source Locations



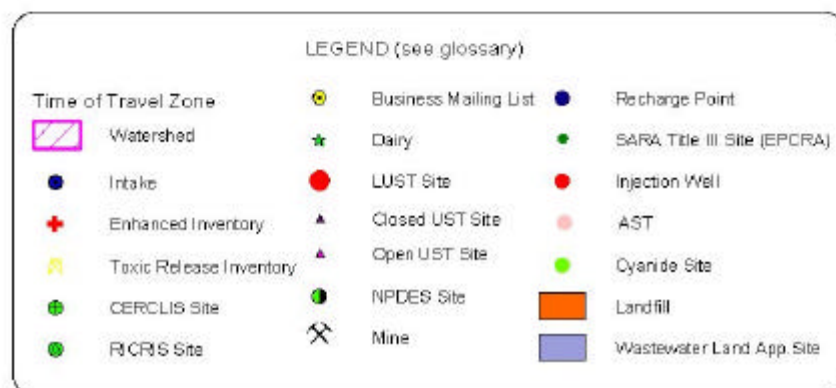
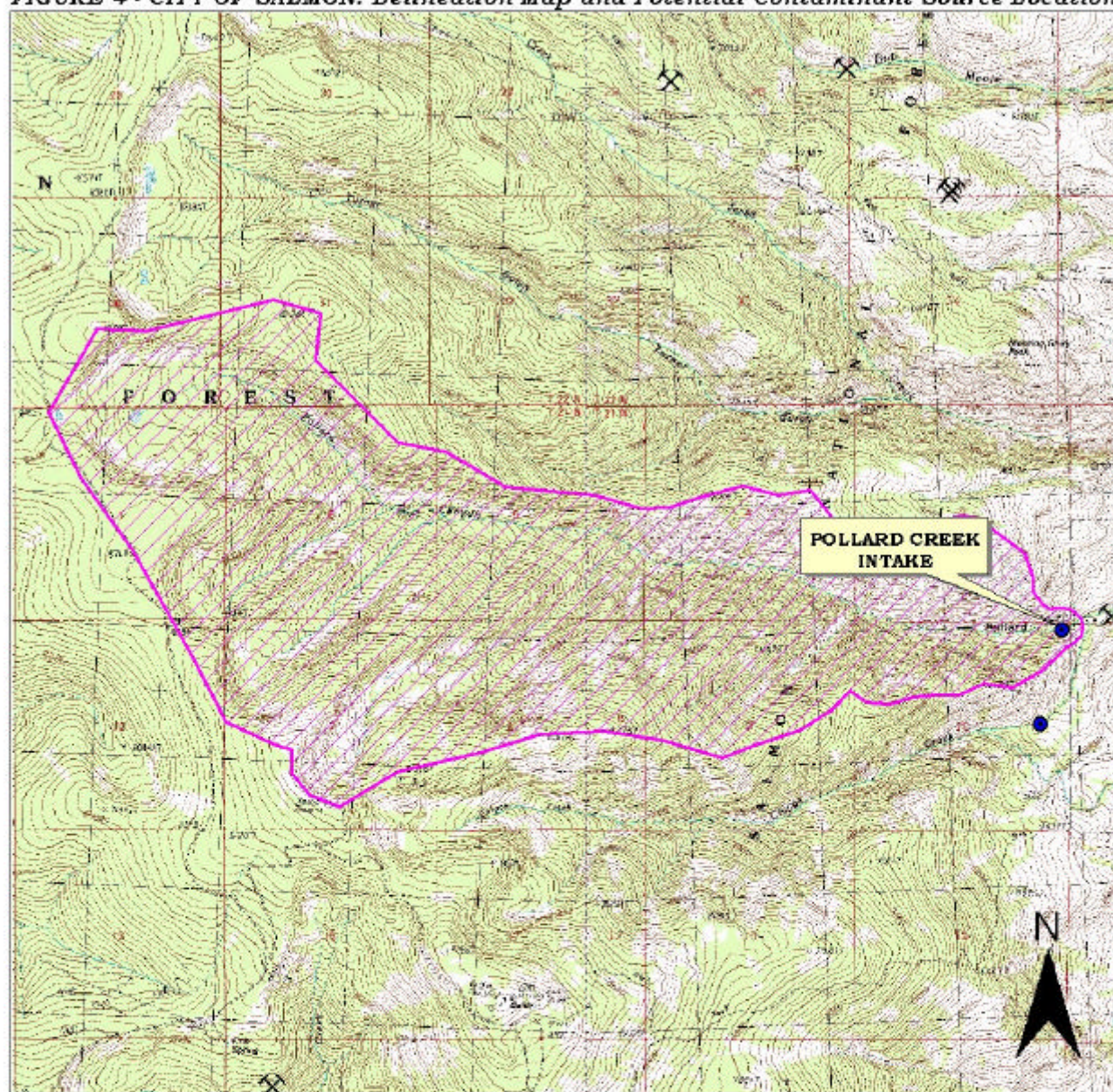
**PWS# 7300042
CHIPPS CREEK**

FIGURE 3 - CITY OF SALMON: Delineation Map and Potential Contaminant Source Locations



PWS# 7300042
JESSIE CREEK

FIGURE 4 - CITY OF SALMON: Delineation Map and Potential Contaminant Source Locations



PWS# 7300042
POLLARD CREEK

The Chipps Creek Intake and the Pollard Creek Intake have no potential contaminant sites within the delineated areas. The Jessie Creek Intake has one mine/prospect and one road that are potential contaminant sites (Table 1). A total of 10 potential contaminant sites are located within the delineated source water area for the Salmon River Intake (Table 2). Potential contaminant sources located within the delineated source water area for the City of Salmon include mine/prospect sites and Highway 93 (Figure 5).

Contaminants of concern consist of inorganic contaminants (IOCs) and volatile organic contaminants (VOCs) related to mineral extraction and IOCs, VOCs, synthetic organic contaminants (SOCs), and microbial contaminants related to an accidental spill from roads or Highway 93.

Table 1. Jessie Creek Intake Potential Contaminant Inventory

SITE #	Source Description	Source of Information	Potential Contaminants ¹
1	Mine - Gold	Database Search	IOC
	Unnamed Road	Database Search	VOC, SOC, IOC, Microbes

¹IOC = inorganic chemical, VOC = volatile organic chemical, SOC = synthetic organic chemical

Table 2. Salmon River Intake Potential Contaminant Inventory

SITE #	Source Description	Source of Information	Potential Contaminants ¹
1	Mine – Bentonite	Database Search	IOC
2	Mine – Gold	Database Search	IOC
3	Mine – Coal	Database Search	IOC, VOC
4	Mine – Sand and Gravel	Database Search	IOC
5	Mine – Uranium	Database Search	IOC
6	Mine – Uranium	Database Search	IOC
7	Mine – Coal	Database Search	IOC, VOC
8	Mine – Gold	Database Search	IOC
9	Mine - Lead	Database Search	IOC
	Highway 93	Database Search	VOC, SOC, IOC, Microbes

¹IOC = inorganic chemical, VOC = volatile organic chemical, SOC = synthetic organic chemical

Section 3. Susceptibility Analyses

The susceptibility of the sources at the intakes were ranked as high, moderate, or low risk according to the following considerations: hydrologic characteristics, physical integrity and construction of the intake, land use characteristics, and potentially significant contaminant sources. The susceptibility rankings are specific to a particular potential contaminant or category of contaminants. Therefore, a high susceptibility rating relative to one potential contaminant does not mean that the water system is at the same risk for all other potential contaminants. The relative ranking that is derived for each intake is a qualitative, screening-level step that, in many cases, uses generalized assumptions and best professional judgement. The following summaries describe the rationale for the susceptibility ranking.

Intake Construction

The construction of the City of Salmon system intakes directly affects the ability of the intakes to protect the source from contaminants. The City of Salmon drinking water system consists of four intakes that produce surface water for domestic, business, and industrial uses. Water from the Chipps Creek intake connects to water from the Pollard Creek intake through piping. This water is piped around a hill and into the Jessie Creek water storage area. Information regarding whether the intakes were constructed properly and located in a way to minimize impacts was unavailable leading to a high rating for these three intakes. The intake system construction score for the Salmon River intake was rated as high because there exists no natural filtration system. There are man-made, constructed, infiltration galleries on the island that the river water flows through before reaching the pumping stations (Table 3).

Potential Contaminant Sources and Land Use

The Chipps Creek, Pollard Creek, and Jessie Creek intakes rated low susceptibility in terms of IOC, VOCs, SOC, and microbial contaminants. The water chemistry tests have detected fluoride and nitrate but at levels which have not exceeded the maximum contaminant levels in accordance with the Safe Drinking Water Act. The Salmon River intake rated low for SOC and moderate for IOC, VOC, and microbial contaminants due to mines in the delineation as well as Highway 93. In the summer of 1993, the system recorded total coliform bacteria and fecal coliform bacteria above the Maximum Contaminant Level (MCL). Treatment efforts including coagulation, flocculation, filtration, and gaseous chlorination have successfully prevented further occurrences.

Final Susceptibility Ranking

Detections of IOC above drinking water standard MCLs, a detection of total coliform bacteria, fecal coliform bacteria, or *E-coli* bacteria, or a detection of an SOC or VOC in a water chemistry test will automatically give a high susceptibility rating for an intake despite the land use of the area because a pathway for contamination already exists. In this case, Chipps Creek, Pollard Creek, and Jessie Creek automatically rate high for microbial contamination due to the MCL exceedence in 1993. In terms of the total susceptibility score, Chipps Creek and Pollard Creek rate low for IOC, VOC, and SOC. Jessie Creek rates moderate for IOC, and low for VOC and SOC. The Salmon River intake rates moderate for IOC, VOC, and microbials, and low for SOC. The large number of mines and Highway 93 are the major causes of this score.

Table 3. Summary of City of Salmon Susceptibility Evaluation¹

City of Salmon Intakes	Contaminant Inventory				System Construction	Final Susceptibility Ranking			
	IOC	VOC	SOC	Microbial		IOC	VOC	SOC	Microbial
Chipps Creek	L	L	L	L	H	L	L	L	H* ²
Pollard Creek	L	L	L	L	H	L	L	L	H*
Jessie Creek	L	L	L	L	H	M	L	L	H*
Salmon River	M	M	L	M	H	M	M	M	M

¹H = High Susceptibility, M = Moderate Susceptibility, L = Low Susceptibility

IOC = inorganic chemical, VOC = volatile organic chemical, SOC = synthetic organic chemical

²H* - Indicates source automatically scored as high susceptibility due to the presence of either a VOC, SOC, IOC or microbial contaminant above Safe Drinking Water Act limits in the finished drinking water

Susceptibility Summary

There are no current, long term, recurring water chemistry problems in the City of Salmon drinking water system. The City of Salmon drinking water system rated low to moderate, with an automatic high score given for microbial contamination due to some of the intakes having detected potential chemical problems during routine sampling. In July and August 1993, the water tested positive for total coliform bacteria and fecal coliform bacteria. The inorganic contaminants fluoride and nitrate have been detected in the water, but at levels below the MCLs for drinking water. The system has a treatment plant that uses coagulation and flocculation in pre-treatment, and continuous shallow bed filtration and a gaseous chlorine disinfection system that has prevented microbial contamination from affecting the drinking water since 1993. Surface water systems are vulnerable to microbial contamination in general and continued treatment is important.

Section 4. Options for Source Water Protection

The susceptibility assessment should be used as a basis for determining appropriate new protection measures or re-evaluating existing protection efforts. No matter what the susceptibility ranking a source receives, protection is always important. Whether the source is currently located in a “pristine” area or an area with numerous industrial and/or agricultural land uses that require education and surveillance, the way to ensure good water quality in the future is to act now to protect valuable water supply resources.

An effective source water protection program is tailored to the particular local source water protection area. A community with a fully-developed source water protection program will incorporate many strategies. For City of Salmon, source water protection activities should focus on environmental education with the community, recreational users, and businesses that operate within the vicinity of the delineation. Most of the delineated areas are outside the direct jurisdiction of City of Salmon. Due to the relatively short time involved with the movement of surface water, source water protection activities should be aimed at short-term management strategies with an emphasis on dealing with long-term future impacts from these same sources. Source water protection activities for agriculture should be coordinated with the upstream communities, the Idaho Department of Lands, the U.S. Forest Service, and other federal, state and local agencies with lands and jurisdiction within the delineated source water area. Source water protection activities for mining should be coordinated with the appropriate state and/or federal agencies responsible for the regulation or cleanup of the mine. Depending on the nature and status of the mine, various agencies could include Idaho Department of Environmental Quality, the U.S. Environmental Protection Agency, the Department of Lands, the Bureau of Land Management, the U.S. Forest Service, or others.

While the surface water sources possesses adequate quality and yield, limitations and vulnerability related to the construction of the intakes should be reviewed. An investigation of the feasibility of a shift to potential ground water sources to augment or replace the current surface water system was completed. The study showed that a switch to ground water was not feasible.

Assistance

Public water suppliers and others may call the following DEQ offices with questions about this assessment and to request assistance with developing and implementing a local protection plan. In addition, draft protection plans may be submitted to the DEQ office for preliminary review and comments.

Idaho Falls Regional DEQ Office (208) 528-2650

State DEQ Office (208) 373-0502

Website: <http://www2.state.id.us/deq>

Water suppliers serving fewer than 10,000 persons may contact John Bokor, Idaho Rural Water Association, at 1-800-962-3257 for assistance with protection strategies.

References Cited

EPA (U.S. Environmental Protection Agency), 1997, State Methods for Delineating Source Water Protection Areas for Surface Water Supplied Sources of Drinking Water, EPA 816-R-97-008, 40p.

Great Lakes-Upper Mississippi River Board of State and Provincial Public Health and Environmental Managers, 1997, "Recommended Standards for Water Works".

Idaho Department of Water Resources, 1993. Administrative Rules of the Idaho Water Resource Board: Well Construction Standards Rules. IDAPA 37.03.09.

Idaho Department of Environmental Quality, 1997. Design Standards for Public Drinking Water Systems. IDAPA 58.01.08.550.01.

Idaho Department of Environmental Quality, 1999, Idaho Source Water Assessment Plan.

Idaho Division of Environmental Quality, 1993, Sanitary Survey for Salmon, City of, Eastern Idaho Regional Office.

U.S. Government Printing Office, 1995, Code of Federal Regulations, 40 CFR 112, Appendix C-III, Calculation of the Planning Distance.

POTENTIAL CONTAMINANT INVENTORY

LIST OF ACRONYMS AND DEFINITIONS

AST (Aboveground Storage Tanks) – Sites with above-ground storage tanks

Business Mailing List – This list contains potential contaminant sites identified through a yellow pages database search of standard industry codes (SIC).

CERCLIS – This includes sites considered for listing under the **Comprehensive Environmental Response Compensation and Liability Act (CERCLA)**. CERCLA, more commonly known as ASuperfund, is designed to clean up hazardous waste sites that are on the national priority list (NPL).

Cyanide Site – DEQ permitted and known historical sites/facilities using cyanide.

Dairy – Sites included in the primary contaminant source inventory represent those facilities regulated by Idaho State Department of Agriculture (ISDA) and may range from a few head to several thousand head of milking cows.

Deep Injection Well – Injection wells regulated under the Idaho Department of Water Resources generally for the disposal of storm water runoff or agricultural field drainage.

Enhanced Inventory – Enhanced inventory locations are potential contaminant source sites added by the water system. These can include new sites not captured during the primary contaminant inventory, or corrected locations for sites not properly located during the primary contaminant inventory. Enhanced inventory sites can also include miscellaneous sites added by the Idaho Department of Environmental Quality (IDEQ) during the primary contaminant inventory.

Floodplain – This is a coverage of the 100-year floodplains.

Group 1 Sites – These are sites that show elevated levels of contaminants and are not within the priority one areas.

Inorganic Priority Area – Priority one areas where greater than 25% of the wells/springs show constituents higher than primary standards or other health standards.

Landfill – Areas of open and closed municipal and non-municipal landfills.

LUST (Leaking Underground Storage Tank) – Potential contaminant source sites associated with leaking underground storage tanks as regulated under RCRA.

Mines and Quarries – Mines and quarries permitted through the Idaho Department of Lands.)

Nitrate Priority Area – Area where greater than 25% of wells/springs show nitrate values above 5mg/l.

NPDES (National Pollutant Discharge Elimination System) – Sites with NPDES permits. The Clean Water Act requires that any discharge of a pollutant to waters of the United States from a point source must be authorized by an NPDES permit.

Organic Priority Areas – These are any areas where greater than 25 % of wells/springs show levels greater than 1% of the primary standard or other health standards.

Recharge Point – This includes active, proposed, and possible recharge sites on the Snake River Plain.

RICRIS – Site regulated under **Resource Conservation Recovery Act (RCRA)**. RCRA is commonly associated with the cradle to grave management approach for generation, storage, and disposal of hazardous wastes.

SARA Tier II (Superfund Amendments and Reauthorization Act Tier II Facilities) – These sites store certain types and amounts of hazardous materials and must be identified under the Community Right to Know Act.

Toxic Release Inventory (TRI) – The toxic release inventory list was developed as part of the Emergency Planning and Community Right to Know (Community Right to Know) Act passed in 1986. The Community Right to Know Act requires the reporting of any release of a chemical found on the TRI list.

UST (Underground Storage Tank) – Potential contaminant source sites associated with underground storage tanks regulated as regulated under RCRA.

Wastewater Land Applications Sites – These are areas where the land application of municipal or industrial wastewater is permitted by IDEQ.

Wellheads – These are drinking water well locations regulated under the Safe Drinking Water Act. They are not treated as potential contaminant sources.

NOTE: Many of the potential contaminant sources were located using a geocoding program where mailing addresses are used to locate a facility. Field verification of potential contaminant sources is an important element of an enhanced inventory.

Where possible, a list of potential contaminant sites unable to be located with geocoding will be provided to water systems to determine if the potential contaminant sources are located within the source water assessment area.

Attachment A
City of Salmon
Susceptibility Analysis

The final scores for the susceptibility analysis were determined from the addition of the Potential Contaminant Source/Land Use Score and Source Construction Score.

Final Susceptibility Scoring:

0 - 7 Low Susceptibility

8 - 15 Moderate Susceptibility

≥ 16 High Susceptibility

Surface Water Susceptibility Report

Public Water System Name :

Public Water System Number

SALMON CITY OF
7300042

Well# : CHIPPS CREEK

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1. System Construction

SCORE

Intake structure properly constructed	NO	1
Infiltration gallery or well under the direct influence of Surface Water	NO	2

Total System Construction Score 3

2. Potential Contaminant Source / Land Use

IOC
ScoreVOC
ScoreSOC
ScoreMicrobial
Score

Predominant land use type (land use or cover)	BASALT FLOW, UNDEVELOPED, OTHER	0	0	0	0
Farm chemical use high	NO	0	0	0	
Significant contaminant sources *	YES				
Sources of class II or III contaminants or microbials	present within the small stream segment of	0	0	0	1
Agricultural lands within 500 feet	NO	0	0	0	0
Three or more contaminant sources	NO	0	0	0	0
Sources of turbidity in the watershed	YES	1	1	1	1

Total Potential Contaminant Source / Land Use Score 1 1 1 3

3. Final Susceptibility Source Score

4

4

4

6

4. Final Source Ranking

Low

Low

Low

Low

* Special consideration due to significant contaminant sources
Source is considered High Susceptibility

1. System Construction

SCORE

Intake structure properly constructed	NO	1
Infiltration gallery or well under the direct influence of Surface Water	NO	2

Total System Construction Score 3

2. Potential Contaminant Source / Land Use

IOC
ScoreVOC
ScoreSOC
ScoreMicrobial
Score

Predominant land use type (land use or cover)	BASALT FLOW, UNDEVELOPED, OTHER	0	0	0	0
Farm chemical use high	NO	0	0	0	
Significant contaminant sources *	YES	Microbial contaminants (Total coliform and fecal coliform) detected above MCL in summer 1993.			
Sources of class II or III contaminants or microbials	present within the small stream segment of	2	1	1	2
Agricultural lands within 500 feet	NO	0	0	0	0
Three or more contaminant sources	NO	0	0	0	0
Sources of turbidity in the watershed	YES	1	1	1	1

Total Potential Contaminant Source / Land Use Score 5 3 3 5

3. Final Susceptibility Source Score

8 6 6 8

4. Final Source Ranking

Moderate Low Low Moderate

* Special consideration due to significant contaminant sources
Source is considered High Susceptibility

Surface Water Susceptibility Report

Public Water System Name :

Public Water System Number

SALMON CITY OF
7300042

Well# : POLLARD CREEK

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1. System Construction

SCORE

Intake structure properly constructed	NO	1
Infiltration gallery or well under the direct influence of Surface Water	NO	2

Total System Construction Score 3

2. Potential Contaminant Source / Land Use

IOC
ScoreVOC
ScoreSOC
ScoreMicrobial
Score

Predominant land use type (land use or cover)	BASALT FLOW, UNDEVELOPED, OTHER	0	0	0	0
Farm chemical use high	NO	0	0	0	
Significant contaminant sources *	YES				
Sources of class II or III contaminants or microbials	present within the small stream segment of	0	0	0	1
Agricultural lands within 500 feet	NO	0	0	0	0
Three or more contaminant sources	NO	0	0	0	0
Sources of turbidity in the watershed	YES	1	1	1	1

Total Potential Contaminant Source / Land Use Score 1 1 1 3

3. Final Susceptibility Source Score

4

4

4

6

4. Final Source Ranking

Low

Low

Low

Low

* Special consideration due to significant contaminant sources
Source is considered High Susceptibility

1. System Construction		SCORE			
Intake structure properly constructred	NO	1			
Infiltration gallery or well under the direct influence of Surface Water	NO	2			
Total System Construction Score		3			
2. Potential Contaminant Source / Land Use		IOC Score	VOC Score	SOC Score	Microbial Score
Predominant land use type (land use or cover)	BASALT FLOW, UNDEVELOPED, OTHER	0	0	0	0
Farm chemical use high	NO	0	0	0	
Significant contaminant sources *	NO				
Sources of class II or III contaminants or microbials present within the 500' of the intake and the		11	4	2	3
Agricultural lands within 500 feet	YES				
	Less than 25% Irrigated Agriculture	0	0	0	0
Three or more contaminant sources	NO	0	0	0	0
Sources of turbidity in the watershed	YES	1	1	1	1
Total Potential Contaminant Source / Land Use Score		9	9	5	7
3. Final Susceptibility Source Score		12	12	8	10
4. Final Source Ranking		Moderate	Moderate	Moderate	Moderate

* Special consideration due to significant contaminant sources
The source water has no special susceptibility concerns